

REMARKS

Claims 1-18, 21 and 22 remain pending in the subject application, of which claims 6-8, 14, 15, 17 and 18 are withdrawn.

By this amendment, claim 1 is amended to more particularly recite structural features associated with the functional language of the claims, and allowable claims 11 and 12 are amended included the features of claims from which the previously depended, thereby placing claims 11 and 12 in independent form. Support for the amendment to claim 1 may be at least found in paragraphs [0033] and [0038] of applicants' originally filed specification. Claims 1, 11 and 12 are independent. Reconsideration of the pending claims is respectfully requested.

A. Introduction

In the outstanding Office Action Made Final, the Examiner rejected claims 1, 2, 3, 9, 10, 16 and 21 under 35 U.S.C. § 103(a) as being unpatentable over the combined teachings of JP 5-315293 ("the JP '293 reference"), U.S. Patent No. 3,543,839 to Shlosinger ("the Shlosinger reference") and optionally JP 8-29080 ("the JP '080 reference"); rejected claims 4, 5 and 22 under 35 U.S.C. §103(a) as being unpatentable over the combined teachings of the JP '293 reference, the Shlosinger reference and optionally the JP '080 reference in further view of JP 2-126049 ("the JP '049 reference"); rejected claims 1, 2, 3, 4, 5, 9, 10, 16, 21 and 22 under 35 U.S.C. §103(a) as being unpatentable over the combined teachings of the JP '293 reference, JP 5-99580 ("the JP '580 reference") and optionally the JP '080 reference; and objected to claims 11-13 as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

B. Asserted Obviousness Rejection of Claims 1, 2, 3, 9, 10, 16 and 21

In the outstanding Office Action Made Final, the Examiner rejected claims 1, 2, 3, 9, 10, 16 and 21 under 35 U.S.C. § 103(a) as being unpatentable over the JP '293 reference, the Shlosinger reference and optionally the JP '080 reference. The rejection is respectfully traversed for at least the following reasons.

Claim 1 now recites, in part:

a heat pipe including a top surface on a top side thereof for receiving a wafer to be baked, the heat pipe to be filled with a predetermined amount of working fluid and having wicks formed on inner sides and an inner ceiling thereof for supplying the working fluid adjacent to an inner floor of a bottom side of the heat pipe to the inner ceiling;

a heater for heating the top surface by heating the bottom side of the heat pipe and the working fluid, the heater extending along and contacting a bottom surface of the bottom side of the heat pipe, the heater and the working fluid sandwiching the bottom side of the heat pipe therebetween ...

Applicants submit that the JP '293 reference, the Shlosinger reference and the JP '080 reference all fail to disclose a heater for heating the top surface of the heat pipe by heating the working fluid, where the heater extends along and contacts the bottom surface of the heat pipe.

Further, applicants submit that the JP '080 reference fails to disclose or suggest a structure including wicks, and the Shlosinger reference and the JP '293 reference both fail to disclose or suggest wicks formed on an inner ceiling of the heat pipe, as recited in applicants independent claim 1. In particular, with regard to the JP '293 reference, applicants submit that in each of FIGS. 1, 2, 4 and 5 of the JP '293 reference, no wicks 96 are shown on the ceiling of the upper evaporator 40A, and one of ordinary skill in the art would not be motivated to arrange the wicks 96 on the ceiling of the upper evaporator 40A in order to encourage heat generated by the heater 24 to pass into the upper evaporator 40A via the ceiling of the upper evaporator 40A.

For at least the following reasons, applicants submit that the combination of the JP '293 reference, the Shlosinger reference and the JP '080 reference, alone or in combination, fail to

disclose or suggest the combination of features recited in independent claim 1, as well as all the features of claims 2, 3, 9, 10, 16 and 21, which directly or indirectly depend from claim 1. It is respectfully requested that the rejection be withdrawn.

C. Asserted Obviousness Rejection of Claims 4, 5, and 22

In the outstanding Office Action Made Final, the Examiner rejected claims 4, 5 and 22 under 35 U.S.C. § 103(a) as being unpatentable over the JP '293 reference, the Shlosinger reference and optionally the JP '080 reference in further view of the JP '049 reference. The rejection is respectfully traversed for at least the following reasons.

As discussed above, the JP '293 reference, the Shlosinger reference and the JP '080 reference fail to disclose or suggest all the features recited in independent claim 1, from which claims 4, 5 and 22 depend. Applicants' submit that the JP '049 reference also fails to overcome the deficiencies of the JP '293 reference, the Shlosinger reference and the JP '080 reference.

For at least these reasons, applicants submit that the combination of the JP '293 reference, the Shlosinger reference, the JP '080 reference and the JP '049 reference fails to disclose or suggest all the features of claims 4, 5 and 22, which directly or indirectly depend from claim 1. It is respectfully requested that the rejection be withdrawn.

D. Asserted Obviousness Rejection of Claims 1, 2, 3, 4, 5, 9, 10, 16, 21 and 22

In the outstanding Office Action Made Final, the Examiner rejected claims 1, 2, 3, 4, 5, 9, 10, 16, 21 and 22 under 35 U.S.C. §103(a) as being unpatentable over the combined teachings of the JP '293 reference, the JP '580 reference and optionally the JP '080 reference. The rejection is respectfully traversed for at least the following reasons.

As discussed above, applicants submit that the JP '293 reference and the JP '080 reference, alone or in combination fail to disclose or suggest the combination of features recited

in independent claim 1. Applicants submit that the JP '580 reference fails to overcome the deficiencies of the combination of the JP '293 and the JP '080 reference, as applied to claim 1. For example, the JP '580 reference fails to disclose or suggest a heater and, as stated in the English abstract, is directed to a looped heat pipe with good cooling characteristics.

For at least these reasons, applicants submit that the combination of the JP '293 reference, the JP '080 reference and the JP '580 reference fails to disclose or suggest all the features of independent claim 1, as well as all the features of claims 2, 3, 4, 5, 9, 10, 16, 21 and 22, which directly or indirectly depend from claim 1. It is respectfully requested that the rejection be withdrawn.

E. Allowable Subject Matter

Applicants appreciate the Examiner's indication of allowable subject matter in claims 11-13. As discussed above, applicants amended claims 11 and 12 to include the features of claims 1, 9 and 21, thereby placing claims 11 and 12 in independent form including all the features of independent claim 1 and intervening claims 9 and 21, from which they previously depended. For at least these reasons, applicants submit that claims 11 and 12, as well as claim 13, which depends from claim 11, are in condition for allowance. Further, for at least the reasons discussed herein, applicants submit that all pending claims are allowable.

F. Rejoinder of Non-Elected Withdrawn Claims 6-8, 14, 15, 17 and 18

Upon allowance of independent claim 1, applicants request rejoinder and allowance of non-elected withdrawn claims 6-8, 14, 15, 17 and 18, which directly or indirectly depend from claim 1.

G. Request Entry of Amendment

Applicants respectfully request that this amendment be entered at least because the amendment: (1) only amends independent claim 1, in response to the Examiner's remarks in the June 22, 2006 Office action, to include structural features, of the heater and working fluid, associated with the functional language previously considered by the Examiner, and amends allowable claims 11 and 12 to include the features of independent claim 1 and intervening claims 9 and 21 to place each of the claims in independent form; (2) does not add any new claims; and (3) place the claims in better form for an appeal. Entry of the amendment is respectfully requested.

H. Conclusion

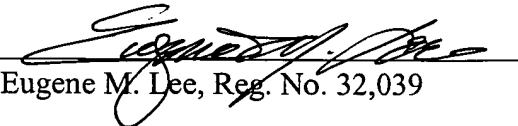
If the Examiner believes that additional discussions or information might advance the prosecution of the instant application, the Examiner is invited to contact the undersigned at the telephone number listed below to expedite resolution of any outstanding issues.

In view of the foregoing amendments and remarks, reconsideration of this application is earnestly solicited, and an early and favorable further action upon all the claims is hereby requested.

Respectfully submitted,

LEE & MORSE, P.C.

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PETITION and
DEPOSIT ACCOUNT CHARGE AUTHORIZATION

This document and any concurrently filed papers are believed to be timely. Should any extension of the term be required, applicant hereby petitions the Director for such extension and requests that any applicable petition fee be charged to Deposit Account No. 50-1645.

If fee payment is enclosed, this amount is believed to be correct. However, the Director is hereby authorized to charge any deficiency or credit any overpayment to Deposit Account No. 50-1645.

Any additional fee(s) necessary to effect the proper and timely filing of the accompanying-papers may also be charged to Deposit Account No. 50-1645.